IN THE CLAIMS

Please cancel claims 1-9.

Please amend claims 10, 21, 36, and 43.

1 - 9. (Cancelled)

10. (Currently Amended) A method of forming an interlayer dielectric in an integrated circuit, comprising:

depositing a fluorinated material on a substrate, the fluorinated material having a top surface;

forming via openings in the fluorinated material, wherein the via openings define sidewalls;

forming a fluorine depleted top surface and fluorine depleted sidewalls by exposing the fluorinated material to a hydrogen containing plasma in a reaction chamber, wherein the plasma is formed in a chamber remote from the reaction chamber containing the fluorinated material;

<u>forming a layer of a conductive material over the fluorine depleted sidewalls;</u> and

forming an etch stop layer over the fluorine depleted top surface.

11. (Previously Presented) The method of Claim 10, wherein the fluorinated material is selected from the group consisting of a-C:F, parylene AF4, carbon-doped SiOF, fluorinated organic polymers, fluorinated siloxane polymers, and SiOF.

12. (Original) The method of Claim 11, further comprising depositing a conductive material in the via openings.

13. (Previously Presented) The method of Claim 11, wherein the fluorinated material comprises parylene-AF4.

14. (Cancelled)

15. (Previously Presented) The method of Claim 10, wherein forming the etch stop layer comprises forming a layer of silicon nitride over the fluorine depleted top surface.

16. (Original) The method of Claim 10, wherein the plasma is formed in a reaction chamber from ammonia and argon at a pressure between 1 mTorr and 50 Torr and an RF power of between 100 watts and 500 watts.

17. (Original) The method of Claim 16, wherein the ammonia is passed into the reaction chamber at a flow rate in the range of 10 sccm to 3 liters/minute.

18-20. (Withdrawn)

21. (Currently Amended) A method of forming a dielectric, comprising:

depositing a material on a substrate, wherein the material is selected from the group consisting of a-C:F, parylene AF4, carbon-doped SiOF, fluorinated organic polymers, and fluorinated siloxane polymers, the material having a top surface;

forming via openings in the material, wherein the via openings define sidewalls;

forming a fluorine depleted top surface and fluorine depleted sidewalls by exposing the material to a reducing plasma in a reaction chamber, wherein the reducing plasma is formed in a chamber remote from the chamber containing the material;

<u>forming a layer of a conductive material over the fluorine depleted sidewalls;</u> and

forming an etch stop layer over the fluorine depleted top surface.

22. (Cancelled)

23. (Previously Presented) The method of Claim 21, further comprising depositing a conductive material in the via openings.

24. (Previously Presented) The method of Claim 21, wherein the material comprises parylene-AF4.

25. (Cancelled)

26. (Previously Presented) The method of Claim 21, wherein forming the etch stop layer comprises forming a layer of silicon nitride over the fluorine depleted top surface.

27. (Previously Presented) The method of Claim 21, wherein the plasma is formed in a reaction chamber from ammonia and argon at a pressure between 1 mTorr and 50 Torr and an RF power of between 100 watts and 500 watts.

28. (Previously Presented) The method of Claim 27, wherein the ammonia is passed into the reaction chamber at a flow rate in the range of 10 sccm to 3 liters/minute.

29. (Previously Presented) A method of forming a dielectric, comprising:

forming a fluorine containing film on a substrate having a top surface;

forming a hardmask layer on the top surface of the fluorine containing film;

forming via openings in the fluorine containing film, wherein the via openings define sidewalls; and

forming fluorine depleted sidewalls by exposing the hardmask layer and the sidewalls to a reducing plasma.

30. (Previously Presented) The method of Claim 29, further comprising exposing the hardmask layer and the sidewalls to the reducing plasma in a reaction chamber, wherein the reducing plasma is formed in a chamber remote from the reaction chamber containing the fluorine containing film.

31. (Previously Presented) The method of Claim 29, wherein the fluorine containing film comprises a material selected from the group consisting of a-C:F, parylene AF4, carbon-doped SiOF, fluorinated organic polymers, fluorinated siloxane polymers, and SiOF.

32. (Previously Presented) The method of Claim 29, further comprising depositing a conductive material in the via openings.

33. (Cancelled)

34. (Previously Presented) The method of Claim 29, wherein the plasma is formed in a reaction chamber from ammonia and argon at a pressure between 1 mTorr and 50 Torr and an RF power of between 100 watts and 500 watts.

35. (Previously Presented) The method of Claim 34, wherein the ammonia is passed into the reaction chamber at a flow rate in the range of 10 sccm to 3 liters/minute.

36. (Currently Amended) A method of forming a dielectric, comprising:

forming a fluorine containing film on a substrate, the fluorine containing film having a top surface and sidewalls;

placing the substrate into a reaction chamber;

forming a fluorine depleted top surface and fluorine depleted sidewalls by simultaneously exposing the top surface and sidewalls of the fluorine containing film to a reducing plasma, wherein the reducing plasma is formed in a chamber remote from the reaction chamber containing the substrate;

forming a layer of a conductive material over the fluorine depleted sidewalls; and

forming an etch stop layer over the fluorine depleted top surface.

37. (Previously Presented) The method of Claim 36, wherein the substrate is a silicon wafer, and the fluorine containing film is a substantially planar insulating layer.

38. (Previously Presented) The method of Claim 36, wherein the plasma is formed from a hydrogen bearing precursor gas and a carrier gas.

39. (Previously Presented) The method of Claim 38, wherein the hydrogen bearing precursor comprises NH_3 gas.

40. (Previously Presented) The method of Claim 39, wherein the carrier gas comprises a gas selected from the group consisting of N_2, Ar and He.

41. (Previously Presented) The method of Claim 40, wherein the fluorine containing film comprises a material selected from the group consisting of a-C:F, parylene AF4, carbon-doped SiOF, fluorinated organic polymers, fluorinated siloxane polymers, and SiOF.

42. (Previously Presented) The method of Claim 36, wherein the fluorine containing film comprises parylene-AF4.

43. (Currently Amended) A method of forming an interlayer dielectric in an integrated circuit, comprising:

depositing a fluorinated material on a substrate, the fluorinated material having a top surface;

forming via openings in the fluorinated material, wherein the via openings define sidewalls;

forming a fluorine depleted top surface and fluorine depleted sidewalls by simultaneously exposing the top surface and the sidewalls of the fluorinated material to a

hydrogen containing plasma in a reaction chamber, wherein the plasma is formed in a chamber remote from the reaction chamber containing the fluorinated material;

<u>forming a layer of a conductive material over the fluorine depleted sidewalls;</u> and

forming an etch stop layer over the fluorine depleted top surface.

44. (Previously Presented) The method of Claim 43, wherein the fluorinated material is selected from the group consisting of a-C:F, parylene AF4, carbon-doped SiOF, fluorinated organic polymers, fluorinated siloxane polymers, and SiOF.

45. (Previously Presented) The method of Claim 44, further comprising depositing a conductive material in the via openings.

46. (Previously Presented) The method of Claim 44, wherein the fluorinated material comprises parylene-AF4.

47. (Previously Presented) The method of Claim 43, wherein the plasma is formed in a reaction chamber from ammonia and argon at a pressure between 1 mTorr and 50 Torr and an RF power of between 100 watts and 500 watts.

48. (Previously Presented) The method of Claim 47, wherein the ammonia is passed into the reaction chamber at a flow rate in the range of 10 sccm to 3 liters/minute.

49. (Previously Presented) The method of Claim 1, wherein the etch stop layer comprises silicon nitride.

50. (Previously Presented) The method of Claim 10, wherein the etch stop layer comprises silicon nitride.

51. (Previously Presented) The method of Claim 21, wherein the etch stop layer comprises silicon nitride.

52. (Previously Presented) The method of Claim 36, wherein the etch stop layer comprises silicon nitride.

53. (Previously Presented) The method of Claim 42, wherein the etch stop layer comprises silicon nitride.